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THE FARMER'S KITCHEN GARDEN.

By Prof. H. W. Elliott.



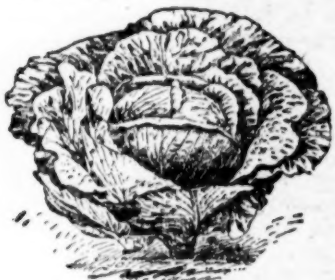
L FEEL a certain reluctance to touch in cold type upon the topic of what a farmer gains or loses as he plants or does not plant a good vegetable garden.

It is a subject that has been dressed up in a multitude of shapes and urged in all sorts of taste. It lies close to the farmer's life year in and year out, and comes up to him three times a day, for all of that time, and of all things that most naturally be best understood this matter of how and what to do in the way of a vegetable garden ought to be most familiar to the farmer.

In all truth, I believe that the absence, as a rule, of well-planted kitchen gardens on our farm lands is not all due to the negligence or the ignorance of the American farmer. It is due to the fact that he feels unable to spare the time necessary for cultivation on the part of himself and his hired help, and only plants a little patch of "truck" for the women to look after with their chickens close by the house.

Therefore, as a general rule, you will find the farmer's kitchen garden only a step to and from his door sill. You will find the vegetables sown in close rows on rich soil, heavily manured and rank with weedy growths. If diligent and timely labor and care is given to this patch the results are often excellent, but unless that great diligence and wise attention is so given the comparative failure of the garden is assured, and the proverbial spread of meat, potatoes, and bread, bread, potatoes, and meat, with unfailing regularity appears upon the farmer's table at that very season of the year when an abundant supply should be present of fresh peas, sweet corn, cucumbers, melons, tomatoes, and beans, snap and Lima, beets, onions, cabbage, etc., when these things taste best and are most craved by the tired, thirsty, and hungry harvesters and stock raisers.

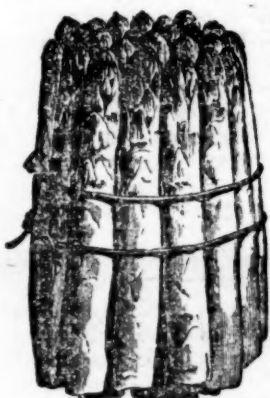
The root of all this failure of the farmer's kitchen garden is, in my opinion, due to the great and initial error made at the outset of, first, in not planting so as to let a horse and cultivator do most of the work of tilling the soil and killing the weeds, and, second, in not removing the garden site to a distance from the house or barn where the chickens do most congregate. Indeed, I think the isolation of the kitchen garden as important to its success on the average farm as its care and cultivation. Every farmer has a flock of poultry, many have ducks, and a few geese and turkeys. These fowls invariably range between the barn and the house, and if the little vegetable garden is within gunshot the chances are that this range will be extended to it. The damage done by scratching and indiscriminate feeding of a lot of such fowls is great and discouraging. It won't do to shut up the hens, for they will stop laying and get sick. They are of more immediate worth than the garden truck; so the garden goes.



MANMOUTH ROCK RED.

It is not my intent to tell the farmer how to plant his garden seeds; how to manage them after they are up and growing is the subject of my writing. He knows everywhere just as well as anybody how to sow his sweet corn, peas, turnips, etc. There is little need of taking type into service for that purpose, but I have found during my ranging in and around the farmer's homes in this region ever since 1872 a great lacking of good direction and care of the family kitchen garden. I propose to outline

the management of a farmer's vegetable garden from which all the necessities and most of the table luxuries for 12 or 13 souls can be drawn from the end of one year up to the beginning of another. Select a piece of ground on your place that is at least 1,000 feet away from your house and barn; this spot thus selected for your kitchen garden should be not less than 200 feet square, nor need it be larger than 250 feet square. If it is a sandy loam or clay, see well to the drainage; it may require underdraining, and if so, do not hesitate to do it; it may lie so that the use of tile is superfluous, and such is generally the case where gravelly sites are accessible.



ASPARAGUS BUNCHED.

To this ground in the Spring, March, haul and scatter 10 or 12 single team loads of well rotted stable manure, free from straw or cornstalks (and haul this amount of manure out every Spring hereafter, composting it during each Summer in your barnyard).

Do not scatter the manure until the day you plow. Then if the ground is just right for plowing, and not until it is, plow as soon as you can after the frost leaves the soil in March; plow deeply with narrow furrows. If the ground is a gravelly loam and mellow after plowing, do not harrow it; never use the harrow if you can help it—rather so time your plowing as to leave the ground light and mellow when the furrows fall into place. With clay loams, great care should be taken in plowing at the right hour, so as to leave the garden ground loose and fine. It must not be too wet or too dry when the plow enters the soil, but just right, or the garden will "bake," and make the labor of caring for it infinitely greater than it should be, for the cultivator and the hoe can and will do three and four times as much and as well per diem on a piece of well plowed ground as on one that has not been so treated.

At one corner of this garden ground lay off a patch of asparagus. Plant a bed there of 150 to 300 plants, so as to cover 50 x 8 feet; this bed will be the greatest single source of edible comfort to the owner that he can establish on his place. It will be in good form for cutting the third year after setting, and steadily improve up to the 12th year; then, lest unimpaired as to yield and quality for the next 50 years, requiring but little care, a few hours' attention every Spring in the way of clearing off the dead seed stalks which you have left over from last season's growth, and the application of a load or two of rich, well-rotted stable manure, lightly cultivated in over the top of the bed immediately after the frost has left the ground. This early, rich manuring, steadily every season, seems to keep the ground warm and starts the quickest growth of this fine, table vegetable, so that from the first week in April until the end of May any amount of asparagus required can be daily cut. When first beginning to cut, it is well to cut everything that springs up. Cut off the bed clean every two or three days, no matter whether the surplus is used or not; then in May let it grow, as you do not want it, cutting only here and there as you may elect for each demand from the kitchen. This insures a full rank growth of seed stalks, which properly ripen the roots and effectually smother all weeds on the patch.

I think it best for the bed that deep cutting be seldom followed, because it usually brings your knife into collision

underground with sprouting buds and destroys in this way as much again as you cut at the time. The best of the asparagus is always that which you find above ground, never letting it grow to a greater height before cutting for the table than six inches; indeed, I cut all of mine when four inches up, getting it most tender and sweet at that stage.

My asparagus bed is on a light, gravelly loam, but it does equally well on clay loam, only requiring that water does not stand on the spot. It is also a great salt eater, and all your pork brine, mackerel kit leavings, etc., should be thrown upon the bed. You need not fear the result of almost any amount of such a sprinkling. It seems to keep the asparagus, and certainly kills the grass and weeds which on such rich places get a prodigious start in the early Spring while you cut back the growing asparagus shoots. After you finish cutting by the middle or end of May, for very few care to eat asparagus longer, then the undisturbed growth after that will so spring up and cover the bed as to effectually choke out and smother all weeds and grass, and the dead seed stalks during Winter will hold snow and keep a warm mantle over all until the opening of the new season.

Then cut off the seed stalks just as the frost leaves, run a light shallow cultivator over the bed so as to mellow up the surface of the ground an inch or two deep, and uproot any grass or weeds that may be there, and at the same time mixing your compost dressing thoroughly with the top soil before the first growth appears, and that growth appears with great certainty after the first two or three warm days and rain early in April. Nothing more wholesome and palatable can be brought out from the kitchen garden than tender asparagus, and yet how few of our farmers have this easily managed vegetable in their gardens; most of them probably deterred by the idea that it requires some extra care and trouble to raise, like celery and the like, when in fact it calls for less attention than a few hills of potatoes do. The plants, 150 of them, can be bought for 75 cents, or 300 of them for \$1.50, and the bed planted in a few hours, which is to last for the natural lifetime of the farmer, and his children, too, for that matter.

So much for the earliest vegetable in our kitchen garden. The next in order is an abundant supply of lettuce, which can be forced in the southern windows of the kitchen, sown in a small shallow wooden box, and transplanted to rows in the garden just as soon as the ground there is ready. Spring frosts do not hurt it, but the ground must be kept clean and mellow and rich in which it is planted. This insures a quick, tender growth. At



IMPROVED RED VALENTINE.

this early period of planting your lettuce you can safely sow your beets and your parsnips and plant your onion sets, and on a gravelly spot it is well to plant your peas. All of these will lie in the ground without rotting, even if it be cold and wet after the frost leaves the earth until it is so warmed by the advance of the season as to cause their germination. I find in this section, or the Lake Erie region, that the frost is pretty regular year in and year out in thawing out by the 25th of March to 1st of April, and I lose no time in plowing the kitchen garden ground immediately after that thawing.

This garden plot of 200 feet square thus plowed gives the farmer 60 rows for planting, three and a half feet apart, all of them, with the slight exception of that little jog in the corner where the asparagus bed goes. The right proportion of planting this patch so as to get a full supply for the family from the beginning to the end of the season is about as follows, gravelly loam:

Twenty rows of early potatoes—plant April 1 to 5.
Two rows of Straggle or Champion peas—plant April 1 to 5.
One row of parsnips—plant April 1 to 5.
One-half row of salsify or vegetable oyster—plant April 5 to 10.
One-half row of early beets—plant April 5 to 10.
One row of carrots—plant April 10 to 12.

One-half row of lettuce—transplant to row from box April 10, or sow in row April 1 to 5.
One-half row of long, green cucumber—plant May 5 to 10.
One-half row of nutmeg or cantaloupe melons—plant May 5 to 10.
One-half row of Yellow Wax beans—plant May 5 to 10.
One-half row of Yellow Wax beans—plant June 1 to 5.
One-half row of Yellow Wax beans—plant June 20 to 25.
One-half row of short, green, pickle cucumbers—plant June 20 to 25.
One row of Lima beans—plant May 5 to 10.
One row of cabbage, Flat Dutch and Early York—plant June 15.
One row of Dwarf Champion or Acme tomatoes—plant May 15 to 20.
Four rows of earliest sweet corn—plant May 10 to 12.
Four rows of Stowell's Evergreen sweet corn—plant May 10 to 12.
Four rows of Stowell's Evergreen sweet corn—plant May 20.
Four rows of Stowell's Evergreen sweet corn—plant May 30.
Four rows of Stowell's Evergreen sweet corn—plant June 10.
Four rows of Stowell's Evergreen sweet corn—plant June 20.

Thus planted, there is left over a space equal to nine or 10 rows which can be divided between the corn and the potatoes as the particular taste of the family may elect. Some families are exceedingly fond of sweet corn, and others not so partial to it. The above planting of potatoes will give from the first digging of them, on the 8th to 10th of July until they all go, from 35 to 40 bushels in dry seasons, and 50 to 60 bushels in wet Summers on gravelly loam. The sweet corn will be ready on the 20th of July, and remains equal to all demand until frost in October; the deferred plantings bringing it in fresh for the table all the time.

Such a garden will, during normal seasons, when it is not unusually dry or abnormally wet, be a source of infinite satisfaction to the farmer and his family from the opening to the close of the growing year, and if he has never indulged in such a planting before, he will wonder as he reaps from it why he has never done so. The salient points of successful planting I shall itemize as follows:

Plant potatoes in hills 18 inches apart in the rows; plant with a hoe, and never cover more than four inches deep. If the season opens wet, use the shovel plow after the first cultivation and hoeing; if dry, never shovel plow, but use the "two-footed" cultivator instead. It will throw earth enough to cover the potatoes, and yet not dry them out so badly as the shovel plow will.

Sow your peas in a shallow furrow or drill row, sow them thinly, and do not cover deeper than one inch. After the first hoeing and when they are about six inches high then brush them; brush them by all means if you possibly can; they will do twice as well when left to roll over on the ground.

Sow parsnips, early beets, carrots, and vegetable oyster in shallow drill rows (make them with your hoe handle) and just cover lightly. If the ground is very light and sandy after sowing and covering, place a strip of straw down on the rows and tramp them lightly; on heavy loam never tramp.

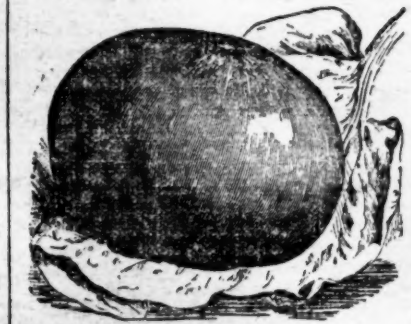
Lettuce is most successful as an early relish by starting it in a box at the kitchen window during March. Then early in April transplant it to the garden row. This action will give good heads for the table from two to three weeks earlier than if delayed for the April sowing.

Cucumbers should be planted in flat, open hills, with an additional enrichment of the earth under these hills. Plant them about four inches apart in the hill, and sow 12 or 13 seeds; then thin out to four and six plants during the first hoeing. Unless you plant an extra number in each hill, the cut worms are liable to take most of the young plants at times when you least expect it. I also, to insure the plants when they first come up against certain flies, cover them with small wooden frames 18 inches square, over which I stretch a bit of mosquito netting. This hastens their growth by warming the hills, and is every way beneficial. In this manner plant your nutmeg melons and your squashes.

Wax and string beans should be planted in hills 18 inches apart in the rows, six or seven beans to the hill, scattered an inch or so apart in the hills. I like the Yellow Wax best; it does not grow tough like the green strings or snap beans, when allowed to hang for several days or a week even after the usual time of plucking. These Wax beans soon become as regularly welcome and necessary to every meal as potatoes do in many families.

Lima beans are simply the *sine qua*

non of all good beans, and will give for a little care the handsomest return of all planting in the garden; but this care they must have. Enrich the ground much more than for any other vegetable, except tomatoes. Sow in a line, putting



TURNER'S HYBRID, OR MUKADO.

the beans down into the earth about one inch with the thumb and fingers, about eight inches apart on this line. Then sink a good eight foot post into the ends of the row, and at intervals of 50 feet between these ends additional posts; sink them at least two and a half feet in the ground. Then stretch three No. 9 iron wires from end to end on these posts. The top wire over the tops of the posts, the next wire 18 inches under, and the third one 18 inches below that. Then at intervals of every 18 inches along these wires fasten grape strings or similar cheap, stout twine, so that they hang firmly down to the ground from these wires.

The beans will self catch and climb up on them, and save the extremely difficult business of getting long, suitable poles for the plants. Unless so trellised or poled they will amount to nothing. But if so cared for they will commence to yield handsomely by the middle of July until frost in October cuts them down. Let a few pods ripen up fully for seed every year, and save it, for all seed to buy that is good, this is the most difficult to secure. These seed pods should hang for weeks on the vines after they first turn yellow before they are picked for seed. Then when so picked, do not shell them out until you are ready to plant again next Spring. Most of the failure in growing Lima beans is due, in my opinion, to poor seed.

Cabbage plants enough can be easily raised for the farmer's garden in a shallow box by the window, but should not be set out in the garden before the middle of June, unless very early heads are desired. These can be put out at the same time you transplant the lettuce; they will not keep, however, and must be used before Summer is over.

Tomato plants are also easily raised in the window for the farmer's garden, if you are outside of the reasonable purchase of such plants, as most farmers are. They require the richest of rich ground for their full perfection, and a sharp eye all through the earlier stages of their growth for that large and voracious tomato caterpillar, which particularly affects these vines. Plant stout seedlings in the rows about two feet apart; if the ground is very rich, two and a half feet. There are now so many good kinds of smooth tomatoes that it is hard to say which one is the best. I like the Dwarf Champion a little better than any other one.

Good sweet corn is another prime article for daily use on the table. Get it early, and plant so as to keep it going until frost in Autumn. I have used a great many varieties. All of the early kinds are good in their way; i. e., small ears and good flavor, but the best and most appetizing is Stowell's Evergreen. It comes late, however, not being ready much before the 1st to 10th of August, while the early sorts can be eaten by the middle of July.



THE WOOLEN EXHIBIT BUILDING.

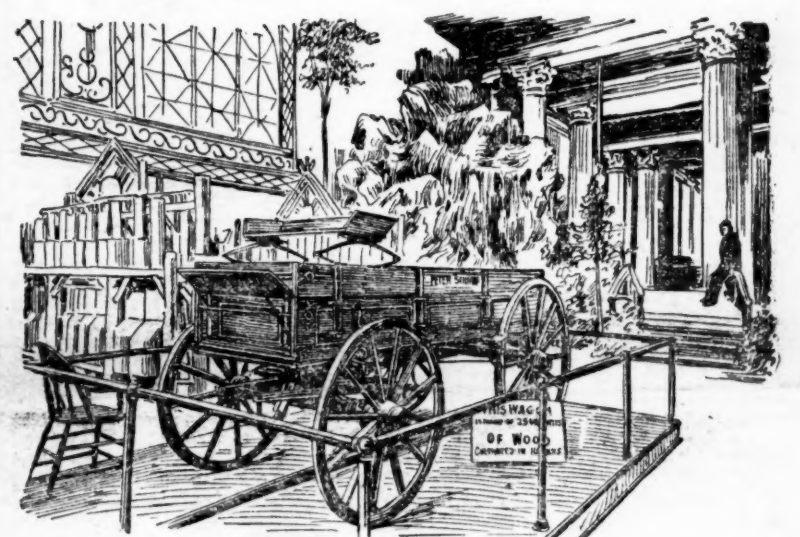
When your peas are done for, as they will be by the middle of July at the latest, pull the brush, cultivate the ground, and by the 25th of July sow your turnips where they grew, "wet or dry," as the day may be.

Leave your parsnips and vegetable oysters in the ground—never dig them until March. They are certainly sweeter and better then than when dug in the

Fall and cellar wilted. Turnips are better kept right out on the ground where they have been pulled in the Fall, with a slight covering of four or five inches of earth thrown over them, if you want any for use in March or April; but your beets and your carrots you must take into your cellar, just as you handle your potatoes.

Such a garden as this one which I have just outlined I know all about, for I have planted and reaped it regularly during these last 27 years. It is as necessary to the comfort and pleasure of my living as is the clothes upon my back; in fact, I would not live in the country without its backing. Many of its products you cannot buy in the best markets fresh and toothsome, and if you could buy them they would be at a costly figure. A few hours' work of a horse and cultivator between the end of May and the 1st of September is all that is needed to keep the space between the rows as clean of weeds as a swept floor, while the hoeing and weeding in the rows may keep a man busy for perhaps a half-day in the week during that period. The weeds must be kept down and the ground stirred mellow, or the best results will never follow.

A Unique Wagon.



In the Illinois State Building at the World's Fair and near the beautiful waterfall is exhibited a wagon which does not have a rival in the world. In appearance it is simply an ordinary wagon of the kind in practical use on farms all over the country. In this its uniqueness does not lie, but in the fact that in its construction is entered material from 25 different trees which are grown in Illinois.

The wagon is complete and is exhibited in a conspicuous place. It stands on a raised platform, and to prevent acts of vandalism it is surrounded by a highly polished brass rail. Lying against one of the rear wheels is a sign which acquaints the visitor of the fact that it is constructed of so many different kinds of wood.

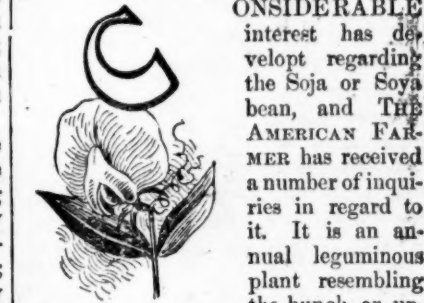
THE WOOLEN EXHIBIT BUILDING.

One of the Most Striking Edifices on the World's Fair Grounds.

The American Woolen Exhibit Building is situated on Columbia Avenue near the great elevator and the Manufacturers and Liberal Arts Building. It is pronounced by good judges as one of the finest and most imposing fronts in the building, second only to those before the sections occupied by France, Germany and Austria. The construction is that of an arcade with a pavilion and tower at each end, and a pavilion at the main entrance to the woolen area. It cost over \$9,000.

THE SOJA BEAN.

The New Legume Which Promises to Be of Great Value.

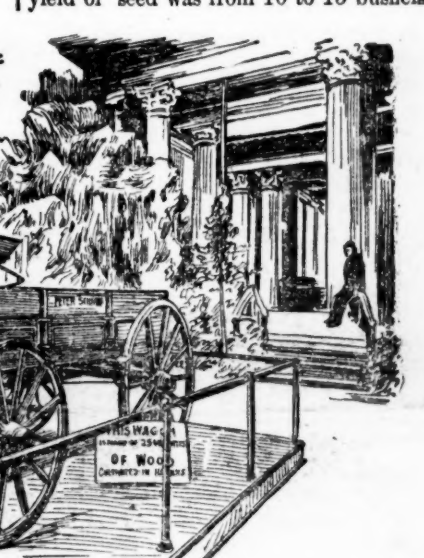


CONSIDERABLE interest has developed regarding the Soja or Soya bean, and THE AMERICAN FARMER has received a number of inquiries in regard to it. It is an annual leguminous plant resembling the bunch or upright varieties of the cow pea. The growth is erect, from three to four and one-half feet high. The stock is strong and woody. The pods occur in clusters of from two to five.

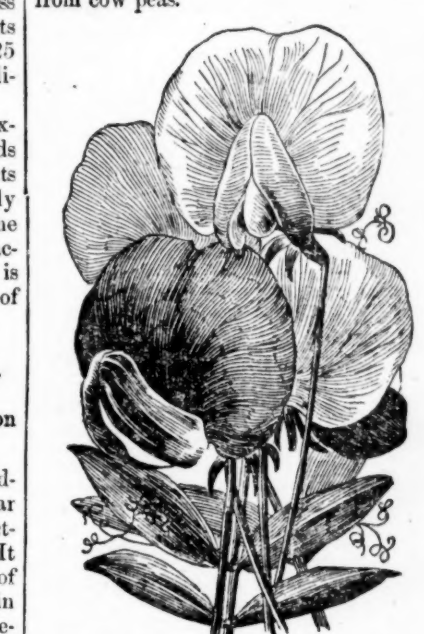
Two distinct species have been called Soja beans. The small bean (*Phaseolus radiatus*) is largely used in Japanese confections, but is of no special value as a fodder plant.

The large bean (*Soja hispida* or *Glycine hispida*) is the true Soja or Soya bean. In Japan this bean is extensively used as food for men and animals.

At the South Carolina Station the yield of seed was from 10 to 15 bushels



per acre. At the Georgia Station, Soja beans yielded 1,307 pounds of beans per acre, while the yield of cow peas on an adjacent plot was only 840 pounds. The weight of dry forage from the former was also greater than that of the hay from cow peas.



The Soja bean is planted in drills, five to seven beans to the foot. It is cultivated like cow peas, and is utilized as a soiling crop, as hay, and as silage.

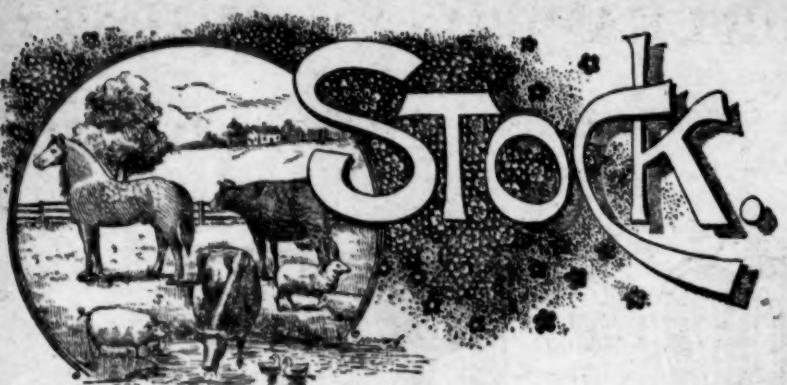
The report of the Massachusetts Station says: "White Soja beans, four rows. The seed was raised upon the station grounds in 1890. It was sown in rows three feet and three inches apart May 18; the young plants appeared above ground May 30, and began to bloom during the middle of July. The lower leaves began to dry up Sept. 4. The crop was pulled to collect the seed Sept. 25."

"Black Soja beans, four rows. This variety is of a lighter green color, and seems to be somewhat more vigorous than the former. It is still green when the white variety has turned yellow. We have raised for several years, successfully, large crops of both varieties of the Soja bean, and consider them for our locality a most valuable addition to our forage crops."

The Louisiana Experiment Station says that it planted both varieties May 23, and they came above ground June 2. The white began to bloom Aug. 9, and the black the next day. The white matured sooner than the other. The plant grows from one to two feet high, and bears an abundant crop of short pods, filled with small round peas resembling the sweet pea. It has a large leaf, which cures into excellent hay with only a few hours of sunshine. At first it was not thought equal to the cow pea, but is now esteemed as much superior to it. The yield was from 25 to 35 bushels per acre.

A Horse of Oats.

Missouri's display at the World's Fair is interspersed with many novel and original designs and is extremely picturesque. Her agricultural resources seem without limit. Grains of all kinds, various grasses and a case of Missouri birds are shown. One of the decorations is a life-size horse made entirely of oats, the mane and tail of pampas grass plumes.



Yard Echoes.

Never allow a diseased hog to come upon the farm.

Winter wheat may be sown after rape, with every assurance of a good crop.

Blue-grass, if sown alone, requires 28 pounds of seed to the acre.

Repair the farm fences while there is not much other work to do on the farm.

Clean out the pig pens before the pigs become sick. Give them plenty of range.

For success in swine raising two things are necessary, a good breed and good feed.

Young stock should be fed on material that will produce bone and muscle, not fat.

Successful steer raisers know that the animal must be kept growing from its birth until marketed.

In stock feeding as much depends upon the manner in which the food is supplied as upon the character of the food.

A bushel of wheat fed to hogs brought in from a clover pasture will often make a gain of 10 to 15 pounds in their weight.

To have a thrifty herd of cattle or a flock of sheep, one must begin at the beginning, before birth, and keep it up until ready for market.

In the weaning of young animals, be careful that they do not get set back. A stunted pig, lamb, calf, or colt can never fully recover and meet your expectations.

The great secret of success in stock raising is controlling the conditions of food and comfort, and thus insuring a quick and vigorous growth and a healthy development, no matter what the season may be.

Scientific investigations have shown the value of different feeding stuffs, and formulated combinations that have changed results in every branch of live stock husbandry. The intelligent-thinking stock grower may reduce his operations to a mathematical certainty.

It is too often the practice of farmers in the early Spring to let all stock depend on the pastures as soon as the grasses begin to start. Such feed is hardly fit to eat, to say nothing of keeping up the system. Stock need strong, nutritious feeds in the Springtime if ever.

Forehanded people are always forethoughtful; when they need anything they look around in advance and order it from some enterprising breeder, who has faith enough in his business to advertise. It is unbusiness-like to put off buying until the last moment and then buy of some local dealer who knows you have to have at once and so makes a big profit on his stuff.

A starved, stunted, lousy calf can never come to thrifty cowhood or make a stately butcher's bullock. The chances of profit have all been missed and the farmer has nothing to hope for from such a depreciated specimen of the bovine genus. It would be wisdom to sell it for what it will bring to someone who seeks to profit by the mistakes of his fellows; who can make a profit on a poor ill-bred or ill-fed animal, not so much by reason of superior skill in feeding, but because he buys it cheap enough for nothing.

THE FARMER'S HORSE.

The Best Breed and the Management and Care Which Should be Given.

The cross made by breeding a full-blooded French draft stallion to a good roaster mare or a thoroughbred mare will make the best horse for the farmer. A colt's education should begin when the animal is 24 hours old. When a horse comes in after a hard day's work, wash his shoulders well with cold water and soap, and give a good feed of oats and hay. After eating, turn him out in the pasture. What feed is the best to keep up the muscular system for this hard work? Oats and good clover or timothy hay, if you give plenty of grain. I think that the co-operative scheme of buying a stallion is very good.—S. N. KIRK, Bloomington, Ill.

The French coach or large trotting-bred horses are the best for the all-around work of the farmer. 2. The best manner of raising and breaking a colt is to feed all the good, clean grain the animal will eat until one year old; then begin to educate and handle. Always treat kindly, and never frighten. 3. When horses come in after a hard day's work in warm weather, let them cool off and feed some hay; then water and give grain. Always water before you feed a horse grain. 4. Good, clean oats ground, or whole, is the best feed to keep up the muscular system; in fact, there is no better feed to produce muscle. 5. I think the co-operative a good scheme for farmers to improve their stock by purchasing a good, first-class stock horse, and perhaps it would pay well to buy a small bunch of purebred mares to start in.—E. COOPER, Adrian, Mich.

The Norman-French draft horse is the best horse the farmer can raise. The best manner of raising and breaking a colt is to teach him to stand tied. Never allow it to follow the dam on the road nor in the field while working. As soon as it is old enough to eat grain, feed it oats and wheat bran mixed three times a day, one-third wheat bran. In breaking a colt, first teach it to lead. After you have it broken to lead, take it back into its stall; then carefully put the harness on. Do not allow any loose straps hung down to touch and scare it. Lead it out and hitch it to the running gear of a wagon, alongside of a gentle horse. Have someone to walk along side of the colt until it gets used to the rattle of the wagon. Get out in the road; drive off a mile or two and back. Never jerk nor whip a colt. After working a horse all day in warm weather, sponge his shoulders well with cold water. Place him in a well-ventilated stall as soon as he cools off. Carry and rub him well with a flannel cloth and bed

ness and gentleness, allow plenty of good, nourishing feed that he might grow and thrive, and at the age of three years put him at some light work; such treatment insures docility. I have rarely experienced the least trouble in breaking colts from Percheron, Suffolk, or French coach stallions when handled in this way.

A mixture of rolled oats and bran is good to sustain the muscular system for hard work. Corn is also an excellent food for this purpose in a cold climate.

I think the co-operative plan for the purchase of a stallion for breeding purposes might be made to work successfully under certain circumstances. Of course, it would depend very materially upon the character, experience, and general intelligence of the men forming the combination. In a locality where a Grange exists, a number of its members who know each other well and are disposed to work together in harmony, might make this scheme prove vastly beneficial to themselves and neighbors, as they could afford to purchase a number one stallion and give the service fees at a reasonable figure.—THEO. SKILLMAN, Petaluma, Cal.

We are in receipt of your circular letter of recent date asking for opinion of the best breed of horses for all-around work on a farm. In reply to this will say that it is an impossible question to answer, from the fact that in some sections they require very heavy draft horses for doing their work, as they drive to town very slowly with heavy loads, and a free and easy going people that are in no hurry to get home again are perfectly contented with a slow trip; whereas in other sections you find an entirely different class of people that will want to make a quick trip to town behind a high spirited driver and so a return, etc. So as to breeds, etc., that is most demanded in different sections would depend entirely upon the inhabitants of said sections. We are very glad to say that by placing a man with his idea of a horse, it almost invariably occurs that the horse has not only suited his neighborhood but also himself.

In your letter you wish to know how we would treat a horse after a day of hard work in warm weather. Will say in reply to this that we think a horse should have a small amount of water and hay to eat until cooled, etc., when it should have what water it wants, after which it should have its grain and then thoroughly cleaned and bedded for the night, etc.

You also ask what feed we would recommend to feed horses to keep up muscle, etc. Would say that we think cats is better adapted to this purpose than any other one kind of grain, although we think a change of feed is quite desirable in keeping a horse with a good appetite, etc.

You also wish to know what we think of the co-operative scheme of farmers forming a company and buying a stallion for breeding purposes. We think this is often very successfully done to the great benefit of the neighborhood getting the horse.—FOWELL BROTHERS, Shadeland, Pa.

In reply to your letter, I will say I am glad to answer the questions to the best of my knowledge. I have tried all breeds of horses, and have found that the Percheron horses are the best all-around horses for the farmer.

The best way of raising and breaking a colt is to not want it until it is used to eat grain with its dam; then tie it in a halter and give all the oats and hay it will eat, and at the age of one year old hitch up to a gentle horse, and there is generally no trouble in working it.

After a hard day's work in the field on a warm day I generally wash the places where the harness rubs and allow them a little water if hot. Let them eat hay for a while, then let them have plenty water. Feed oats, and after a few hours put them in a good pasture during the night. Oats form the best feed for hard-working animals.

I think it is a very good idea for a number of farmers to purchase a good stallion for breeding purposes. They, together, can afford to buy a good number one horse, and then they can raise good colts. They have the same horse right along, and are more apt to raise nates.—E. F. KLEINMEYER, Wilton Junction, Iowa.

An English Shire cross with Percherons will give the best horse for the all-around work of the farmer. We breed Percheron mares to Shire horses.

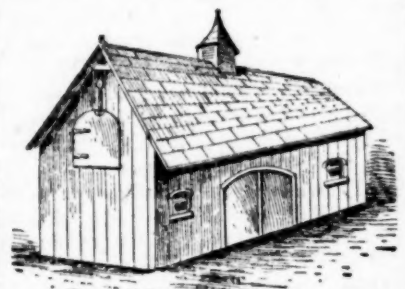
We feed and handle our colts when weanlings, feed and break to harness when two years old, and use carefully at three years old.

Work a horse carefully, and give rest in shade every three hours in warm weather. Feed bran from wheat, ground oats, with wheat meal.

We think very little of the co-operative scheme. Many owners lose the horse by this operation.—MARTIN'S VALLEY STOCK COMPANY, South Dakota.

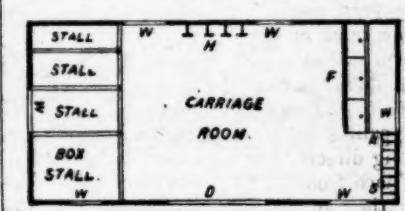
A Farm Stable.

The illustration we here show is a building that is convenient and practical for a farm stable. It is 25 feet wide by 40 feet long and 20 feet high, making room for four horses and vehicles, harness,



A FARM STABLE.

and feeding bins. The box stall, in addition to those used as regular stalls, will always be found convenient for reasons best understood by those who handle horses. The loft for hay is ample for the storing of hay or grain, and when necessary it can be so arranged that the hay can be pushed down into the manger of each stall from an opening in the floor over the stall a convenience that does away with carrying it down the stairs, littering up the lower floor and creating unnecessary work so easily avoided by this simple arrangement. This building can be built for \$200, and built substantially. The construction of it can be saved if you are handy with tools and the cost cut down about one-half.



GROUND PLAN.

A hay window at the end is within easy reach of the wagon, and the block and tackle or a hay harpoon makes its removal from the wagon to the loft an easy task. The ground plan shows the arrangement fully. The letters D for door, S for stair, W for windows, H for harness pegs will indicate each thing or

fixture, F being for feed bins. This plan is simple, neat, and practical, such as any farmer requires.—J. W. CAUGHY, Esq.

BETTER TREATMENT OF STOCK.

The Great Profit of Making Animals Comfortable.

EDITOR AMERICAN FARMER: The severe competition in stock raising, the wide difference in results obtained by different farmers not only in different sections of the country, but by neighboring farmers, lead to the conclusion that there is a cause for all this, and that the remedy can be found. The consideration of this subject need not be confined to older countries. It must begin at home with the means that surround the farmer. Shrewd, observing farmers have always noticed that their farm animals do not keep in comfortable condition so easily during the hot, dry months of July and August. This cannot be accounted for on the score of lack of feed and water, although such lack must increase the troubles. It is to be attributed largely to the lack of shelter from the broiling rays of the sun and the annoyances of flies and other insects that make life almost unbearable. Notice the unrest and discontent of cattle and colts; mark the misery of hogs and the utter abandonment of sheep to all sense of danger and appreciation of safety. A closer inspection will reveal the fact that flies, fleas, ticks, and worms are the cause of this horrible existence.

It is not alone sufficient that ample pasturage is provided; that plenty of good, pure water should be ready of access. A system of comfort outside of and beyond all these alone will serve to give comfort, quiet, repose, and thrift. It is not unusual to find horses and dairy cows in cool, clean barns with doors and windows screened against flies and mosquitoes, or so closely shut as to be dark and cool during the long, sultry hours of the summer day, with a supply of forage and water regularly given them. This is in grateful contrast to the average treatment of farm animals in the summer time on Western farms, but when once begun will not be abandoned.

Not alone is this confined to cattle and horses. In one instance, many years ago, the writer was visiting Vermont flocks in the hottest days of August, when even a Green Mountain pasture was a hot place; too hot, in the judgment of the painstaking humane Merino breeder, for his sheep. The flock had been to pasture since daylight, and at 10 o'clock had been brought to the barn to lie on clean bright straw, as fragrant as new mown hay, and chew their cuds with comfort until 5 o'clock in the afternoon, when they were returned to the pasture for a couple of hours before dark.

The hogs on this farm, though few in numbers, were luxuriously cared for. This treatment was humane, and it was likewise profitable. There are plenty of such instances not alone in Vermont, but all over the country, wherever intelligent, prosperous farmers are found. It may be a question whether stock are willing to quit the pasture at 10 o'clock, or any other hour before high noon, and be confined as outlined above. It may be observed with what reluctance the stock are gathered from the fields in the evening as the atmosphere cools. The ground becomes moist when the hungry, tormented animals are so anxious to fill themselves. This is true, but the certainty of finding a cool retreat and a supply of forage in the barn would cause the animals to meet the attendant promptly, to the minute, to be transferred from the purgatory of a pasture. The reader, if he has not reached such a system of caring for the farm animals, will suspect that this article is advocating some method of "soiling," which has been considered "book farming," and hence expensive and impractical.

The subject of soiling has long been discussed and largely ignored by the average Western farmer. This, like many of the other practices and traditions of the past inheritances of the forefathers and relics of a respectable but antiquated language has to be resorted to—accepted as a factor in a better agriculture and a more reliable, permanent system of stock raising. Like other changes, it must come when nothing else will do; when there is nothing else to meet the emergency, and the sooner the better. The time is already past in this country for simply keeping stock. The present system may be denominated raising stock, but the culture of farm stock means the highest and best processes and principles and in connection with intensive farming. This is the future of all live stock industries in countries that have or shall reach the highest and most prosperous agricultural development. The few who have excelled in the past, the pioneers, the leaders, and their ex-or will be taken up by others and finally become the practice of all.

It may be considered by the many as too expensive with the price of labor which prevails at present in this country.

This is the usual view taken by the many, but as lands increase in value, and farm products increase in value, it will be found that two acres of land can keep four steers and proportionate number of sheep, etc., instead of the same acre of land keeping one steer. And it will be found that less time will be required under most economic arrangements to attend to stock in this way than is now believed possible. In other words, it will be found that it is the only way to profitable stock raising, and it will be done.—R. M. B.

A crop which will produce a good yield of forage and hay upon light soils is one of the things that we need. The Michigan Station thinks we may have it in Spurry, an annual which they have recently been testing with good results.

This is called a weed in Great Britain, but is a hay and forage crop in Belgium, France, and Russia.

SHEEP AND WOOL.

Shearings.

A poor sheepman with poor sheep will be a sorry failure.

Clean, bright, fleshy lambs sell on sight. Remember that.

Sheep stealing is largely on the increase in some of the Australian colonies.

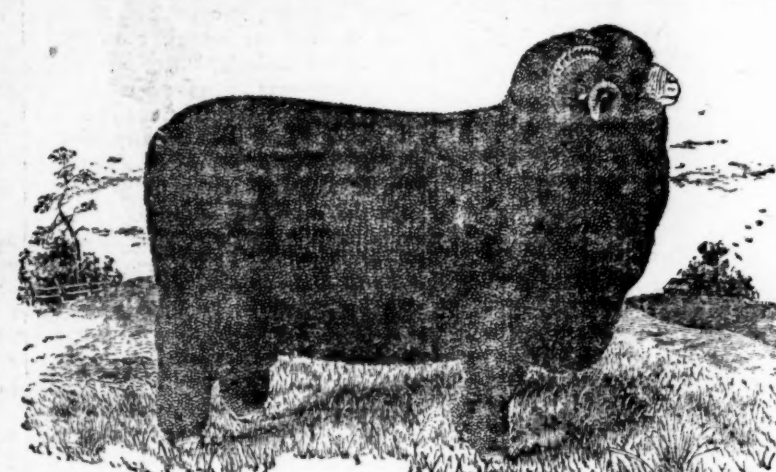
An era has been reached in American sheep husbandry in which no Nation on earth can expect to shut us out.

When a sheep is to be sold put it in the best possible mutton condition. Never think of selling a thin, poor sheep on any account.

Last year Arizona marketed 5,400,000 pounds of wool and 100,000 muttons. The sheep industry is gaining rapidly, and already exceeds all of the live stock industries.

Don't allow the boys to tease the stock ram. A butting ram is a great nuisance as well as a dangerous animal, and the boy that taught him to butt does a low, criminal act.

Lamb raisers manage to boom the ewes judiciously from the time they take the



MERINO RAM.

We present a cut of the Merino sheep, which may serve as an object lesson for the student of sheep husbandry in this country. It is a two-year-old ram, dropped in the Spring of 1888. This ram may be considered a standard American Merino in every respect. "Two days before he was two years old he weighed 200 pounds, and clipped the steady day of 40 pounds." He was shown each year before a committee, and these figures are from the official record.

ram until the lamb is dropped. This gives the lamb a send off and prodigious results are secured.

The recent cut on prices caused by the rush of Texas sheep on the Northern market and the accumulation of ewes, will give the lamb raisers cheaper ewes for the coming crop than has occurred for years.

The well bred, well fed, and properly managed flock is exempt from the curious and fatal ills that usually come to the ordinary sheep raiser. We have not learned, as we shall, the importance of vigorous health in overcoming diseases. If this resistive force is lost there are opportunities for latent ailments that were not suspected and losses result. On this statement we pin our faith in profitable sheep raising.

An examination of the statistics of horses, horned cattle, sheep and swine of the country shows some surprising things. Placing our population at 65,000,000, we find that there is but one horse for every four and a small fraction of one per capita; that there is but a trifle over three-fourths of a horned cattle for every unit of population, while there is but two-thirds of a sheep for every person of the population.

Millions of locusts, fat and immense in size, have made their appearance on the sheep ranges of the Big Horn Basin. The insects swoop down upon the sheep in swarms, when they are eagerly pursued by the animals and devoured. As a fattening diet they are said to be superior to the best grass upon the ranges, and sheepmen are seriously thinking of devising some means whereby the insects may be propagated and preserved, to be fed to the sheep during the winter months.

A correspondent complains of getting \$3.75 per 100 pounds for his Spring lambs, while a neighbor received \$6 for his, and asks why this cruel difference? We do not think it worth while to offer any explanations in this case. It is safe to conclude that each man received all his lambs were worth. There are farmers who think it all foolishness to breed for first-class lambs; who do not believe it pays to feed for \$6 lambs; who do not know how to make plump 60-pound lambs at eight weeks old; who think it too much trouble to produce Easter lambs, which bring a better price than June lambs. No, we can't tell why all these differences in values of lambs. Just keep run of your neighbor's managements and methods and you will find a better explanation than can be attempted here.

Notwithstanding the uncertainty that confronts the sheep raisers, there never has been a time when the farmers of this country were so anxious to find rational, substantial information that can be turned to their practical and material advantage. The fanciful and unreal has not a ray of comfort; these no longer interest the progressive farmers; they look for the information that will give the best results in the shortest time and at the least expense. It is found that much of the artificial, impractical, and played out notions of the past have to be abandoned or the sheep industry must be given up until the old conditions are restored. Such returns are impossible. The country realizes the hopelessness of waiting, and at once turns attention to such adjustments with what seems to be the permanent conditions, such as the demands of the produce market, the wants of agriculture and the competitors, both domestic and foreign. There are open opportunities, and the progressive sheep raiser is hunting for them earnestly.

What to Do With an Old Pine Field in Virginia.

A Virginia gentleman asks, "What

would you do with a 1,000-acre plantation in Virginia?"

It is to be regretted that more definite information was not given of this old plantation. The term "old" is a safe conclusion, since much of these lands were in cultivation long years, perhaps hundreds of years, before the founding of the Jamestown Colony in 1607. This is shown by the statements of the early colonists that large supplies of corn were gotten from the Indians then inhabiting that part of Virginia.

A typical Virginia plantation of 1,000 acres usually contains from 40 to 200 acres in cultivation and the balance consists of old pine fields. This latter means what it says—fields that have been turned out and have grown up in pine trees to recuperate by the forces of nature. This system of farming has been practiced certainly since Colonial times, and may have been taught them by the Indians, as it is so unlike any other people that we now know of.

About these old pine fields there is much significance in that there are so few large trees. The original forests are wanting as found in other parts of the United States; at least, on lands where cultivation is possible.

The questioner does not say whether

DIMINISHING NUMBERS.

Frightful Decrease of Sheep Values in Washington County, Pa.

As a result of the talked-of change in the tariff on wool, a shrinkage of \$10,000,000 in values in Washington County, Pa., alone is recorded. Recently at the sale on the Gillespie farm 250 sheep were sold at a sacrifice. Good two-year-old ewes and wethers brought only \$1.20 per head; four-year-olds, 93 cents per head; nice straight Spring lambs, 80 to 95 cents per head. A year ago these would readily have sold for \$2.50, \$3 and \$2, respectively. The farmers paid out and that with a prospect of free wool during them in the face they did not care to invest in any more sheep.

According to the census of 1880, Washington County contained 4,120 sheep and the wool clip amounted to 2,416,866 pounds. If the clip of this year is as large as that of 1880, it is easy to see that the free trade attack on the tariff has taken \$141,866 out of the income of wool growers. If the 1912 wool clip would reach \$1,383,360 and the depreciation fully 50 per cent, or \$691,680, which, added to the loss on the wool clip, gives \$933,336. In 1880 more wool was given in this country than in any other in the United States. As nine out of 10 farmers grow wool, land was valuable. The County contains 446,463 acres, recently valued at \$80 per acre. With the prospect of free wool the price has dropped to \$60 per acre.

The Southdowns.

Southdown sheep breeders cannot be otherwise than proud of this well known and highly prized breed of sheep at the World's Columbian Exposition. The American Southdown Breeders' Association has well used its powerful influence to the end that the exhibit should be a respectable one, and the large number and fine quality of animals that were found for competition was convincing evidence that this work had not failed on unfruitful ground. The Southdowns, it will be seen, are yet leaders in the race for popularity as to mutton breeds—the farmer's sheep.

For the special premiums, amounting to \$1,250 in cash by the American Southdown Breeders' Association, the following named breeders made entries: W. E. Spicer, Harvard, Neb., 12 animals; P. A. Scott, Huntsville, Mo., 13; J. H. Potts & Son, Jacksonville, Ill., 7; J. R. Harvey, Burlington, Neb., 9; T. B. Bonington, Graton, O., 8; John Jackson & Sons, Abingdon, Ontario, Canada, 26; D. J. Jackson, Abingdon, Ontario, Canada, 9; F. W. Barrett, Wadsworth, N. Y., 13; A. Teller & Sons, Paris, Ontario, Canada, 4; John Rutherford, Rossville, Ontario, Canada, 2; T. G. Douglas, Galt, Ontario, Canada, 18. Entries were also made from the flocks of W. D. Irvine, Danville, Ky., R. M. Fisher, Danville, Ky., W. U. Noble, Brecksville, Ohio, Geo. McKerrrow, Sussex, Wis., Frederick Billings Estate, Woodstock, Vt., and Geo. Baker, Simcoe, Ontario, Canada.

Something About Sheep Pastures.

The grazing of mountain ranges in California and similar regions with sheep has lessened the ravages of forest fires which were so dreaded by settlers and so destructive to timber.

THE AMERICAN FARMER called the attention of sheep farmers to the question of providing shelters from the hot suns of Summer a year ago, and insisted that shade was as important as protection from rains. Every observant man knows how well sheep appreciate a cool, dark place, where they can get away from the hot sun and the annoyance of flies. How quickly they find the shadow of a tree or bunch of brush; how nearly impossible it is to drive them from such places.

We beg leave to renew our suggestions of a year ago on this subject and ask that sufficiently roomy shelters be provided in every division of the pastures. Do this so wisely, following the instinctive preferences of the sheep for the points of land, and there put the sheds of whatever sorts are decided upon. A shed of brush three or four feet high is better than none. A straw shed is the very worst of all, since it will soon get out of shape and water soaked so it will rain for a week after the rains cease. A good shingle roof is the best and cheapest in the long run.

The wetness of this Spring favors the excessive growth of pastures and the unwholesome qualities of the grasses. To obviate possible troubles arising from such rank, foul conditions, the prudent farmer will subdivide with fences and confine the sheep on such areas of pasturage as they can feed off close without stinting them too closely.

In changing sheep from a short pasture to a better bite of grass avoid turning on while the grass is wet. It is better to let the sheep into rank pastures for an hour only, and the afternoon, until they are accustomed to large supplies of grass.

Lincoln Sheep Thriving.

EDITOR AMERICAN FARMER: Notwithstanding the dull times, the Lincoln sheep trade thrives. Sheepmen are finding out that they cannot live by wool alone, and in casting around for a breed to cross, many try the Lincoln. A man who has once used this breed for crossing becomes an enthusiast over them. I have shipped Lincolns to Ohio and Indiana and over Michigan, and have inquiries from Montana, Minnesota, Iowa and Arkansas. Customers write they are well pleased with the stock (have had nothing but praise of stock so far). Our Association has registered 530 sheep since Jan. 1, 1893. For an Association not two years old, we think we have done well.—H. A. DANKLETS, Secretary Lincoln Sheep Breeders' Association.

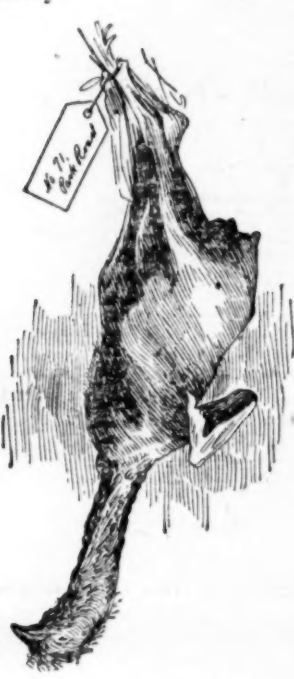
Leopold Leverton's Love.

LEOPOLD LEVERTON was in love once more! Ever since his quarrel with Laura Gray in the Summer he had been paying desultory court to Dorothy Pearson, and now, hearing that Dollie had just inherited a sweet little legacy from a recently deceased maiden aunt, Leopold—or, as his friends were wont to style him, Poly—had come to the conclusion that her charms were utterly irresistible.

If Leopold did occasionally experience twinges of remorseful regret for the old delightful days, he carefully concealed his feelings, and with all the impetuosity of his nature he resolved to beat George Speedman out of the running, win the fair Dollie—and her legacy—for his own, and live happy ever after.

As Leopold sauntered through the town a happy thought struck him. He would send Mrs. Pearson a Christmas gift—something which would influence her to make the proposal he intended making to her daughter at the earliest opportunity.

What should the "something" be? A goose? No. That might suggest odious comparisons. A turkey?



Yes. That was the very thing; a turkey it should be!

He immediately proceeded to put his design into execution, and after examining a considerable number of obese gobblers he finally selected a fine, fat fellow eminently qualified to arouse Mrs. Pearson's housewifely admiration and mellow the heart of her rotund little spouse.

"Just give me a scrap of paper and I'll write you the address to where I want it sent."

"Certainly, sir. Here you are, sir," and the shopkeeper handed Leopold a memorandum sheet.

Now, it chanced the poulterer's errand lad was one of those poetic souls who, in accordance with the eternal unfitness of things, are to be found in all parts of the civilized globe engaged in the most prosaic and unbecoming occupations, and he had in an idle moment inscribed upon the back of the slip of paper a line of Longfellow's which had taken his fancy. This inscription, however, escaped notice.

"That will do capital," said Leverton, and he proceeded to write:

No. 71 Trotterville Terrace, Park Road. With Leopold Leverton's compliments.

"There," said he, "that will do. I'll just pin it to the turkey. You will send it at once, won't you?"

"Immediately, sir," replied the tradesman, briskly. "No. 71 Park Road, sir. Right, sir."

By a curious coincidence—or it may have been a fatality—George Speedman strolled leisurely up, unseen by Leopold, who walked off light heartedly before him.

"No. 71 Park Road!" said Speedman, mentally. "What's Poly been ordering for No. 71?"

He turned and looked into the shop. "What does this weigh?" inquired George, indicating the one Leverton had just purchased and which still lay on the stall with the scrap of paper conspicuously attached.

"That one's sold, sir. Here's one that 'ud pass as twin brother to it."

"Ah," said George, perusing the lines which his rival had penned, "well, weigh me that one."

Oddly enough the same happy thought had occurred to him which had been conceived by Leverton.

"Thank you, sir. Where shall I send it to?"

"Oh, I'll take it, thanks," replied Speedman. And straightway he trudged off to Park Road with his burden.

There was a puzzled look on his face as he picked his way through the crowds of holiday makers that thronged the town, and it was still there when, having left the shops and throngs behind him, he stopped for a moment to light a cigar.

Hardly had he proceeded a dozen

yards along Park Road, however, when the cloud suddenly lifted.

"By Jove! I have it!" he exclaimed aloud with a gesture of satisfaction, much to the surprise of a young lady who chanced to be passing him at that moment.

After relieving his feelings by the outburst just recorded George Speedman quickened his pace and a few minutes later was standing in the presence of the fair Dollie's maternal relative, presenting with the most graceful and insinuating manner he could command the unfortunate bird, which he relied upon to wing him into a favorable position for laying siege to the daughter's heart.

What his success was may readily be surmised from the fact that when, in response to Mrs. Pearson's invitation, he arrived later in the evening of the same day to dine with the family the good lady met him at the hall and whispered that Dollie was alone in the drawing-room.

George entered the room with a quickly-beating heart, and what passed there is best known to Dollie and himself, but it is a significant fact that when, half an hour later, the young couple emerged in response to the summons of the dinner gong Dollie's cheeks were in hue like the deep heart of a crimson rose, and there was an extremely long silken hair clinging to George's manly waistcoat.

Just prior to the announcement of dinner Leopold Leverton had arrived in a condition of pardonable anxiety as to the result of his stratagem.

It was doubtless very considerate of Mrs. Pearson to keep him engaged in conversation with herself in order that the privacy of the more fortunate gentleman, who had come to woo, might be uninvaded; but he was extremely perplexed and chagrined that Mrs. Pearson made no reference to the superb turkey.

"You will stay and take dinner with us, Mr. Leverton?" she said, still without mentioning his gift. It was passing strange.

"Thank you," he responded, musingly.

Then a terrible fear took possession of his heart. Had the dealer forgotten or omitted to send the bird? He could bear the suspense no longer.

"I—ah—did—ah—receive—a—a turkey this afternoon, Mrs. Pearson?" he stammered.

"Yes, indeed, and a fine one it is. Ah, there's the gong. Come, Mr. Leverton."



"LAURA, I HAVE BEEN A FOOL. CAN YOU FORGIVE ME?"

At that moment Speedman entered the dining-room with Dollie leaning upon his arm.

"Mrs. Pearson—Mr. Pearson—congratulate me. Dollie has promised to be my wife."

It was George who spoke, with sparkling eyes and triumphant tone. Leopold could scarce believe his ears.

"What?" he cried, while Dollie hung her head and blushed bewitchingly.

"Yes. May I congratulate you on having resumed your engagement with Miss Gray?" answered George, seating himself beside Dollie.

"What—what do you mean?" stammered Poly, hopelessly bewildered.

"Oh, nothing. Only I thought as you were sending them a turkey you must have."

It was now George's turn to look surprised.

"I don't understand. There's some mistake. I ordered one to be sent here, hoping Mrs. Pearson would accept."

"The one I saw was addressed to 71," interrupted George, thinking he began to see light.

"Yes. This is 71, I noticed the number on the garden gate as I passed this morning."

"No," chimed in Mr. Pearson, "this is 171. I noticed the other day that the first figure was almost washed out. We must have it repainted."

"Then my turkey has gone wrong,"

exclaimed Leopold. "I must see about it."

He was, as has been previously remarked, an impetuous young man, and before the others could recover from their surprise he was hurrying down the road.

"Who lives at 71?" asked Mr. Pearson after a short interval of silence.

"The Grays," answered George promptly. "Moved in last week."

Had Leverton stayed one moment to reflect on Speedman's words it is probable that he would have sacrificed a dozen turkeys rather than risk meeting the wrathful pater of his discarded lady love, but so bewildered was he that the possibility of such a contretemps never entered his mind.

The advent of the fateful fowl, with Leverton's note attached, in the Gray household had caused almost as much bewilderment in that household during the afternoon as Leopold was himself experiencing at that moment.



SPEEDMAN ENTERED THE DINING-ROOM WITH DOLLIE LEANING UPON HIS ARM.

Mrs. Gray unpinned the scrap of paper and read it.

"Why, Laura, Laura!" she called, running up to the room where her daughter was dressing for a walk. "Mr. Leverton has sent us a turkey!"

Laura laid the brush she was using and stood gazing at her mother in silence. Then the color mounted to her cheeks, but she did not speak.

Laura read the lines and returned the paper. She was still strangely silent, and her mother, anxious to have an expression of opinion from someone else, trotted off down stairs again to consult Mr. Gray as to what should be done. Laura followed her closely.

Mr. Gray took the slip of paper in his own hands, read it carefully, re-read it and then turned it over, as though seeking further enlightenment.

His eyes fell upon the line which had been written by the lad with the poetic soul:

Let the dead past bury its dead.

"I suppose he means he would like us to let bygones be bygones," replied Mrs. Gray slowly. "Don't you think so, Laura?"

"Yes," said Laura very softly.

The afternoon wore swiftly away. A faint appetizing odor arose from the kitchen and gradually permeated the apartment.

These cases properly made and cared for will last a lifetime, but if they are "thrown together" or made of poor, knotty or green lumber or left year in and year out unpainted, they will be a source of "trouble and vexation of spirit," and the same applies to other supplies. But let us return to our pile of cases which we left partly filled with the bees of different colonies.

The light only entering at one point, and that point at the top, the bees seek it and through the large opening in the cover pass into the wire cloth cone and thence into the open air, and if the opening in the cone is the right size there will be no returning to the cases. They will quietly disperse and return to their respective hives. Of course, for each pile of cases we need one of these cones, and it is the only kind we think we would care to use, and were we taking section honey we would not fuss with a board for each hive and a 20 or 25 cent bee escape fitted to each one. The writer used this method over 20 years ago when bee escapes were unknown, and managed an apiary of 400 colonies with no help whatever except the assistance of a little boy in the honey room when extracting the honey. Long before the last case is removed from the hive, if the apiary is large, the first pile of supers are cleared of bees and ready to be extracted, and they can then be wheeled into the honey house (if they were piled outside).

The reader will notice that we have removed the honey from our bees without moving a frame from its place or using a bee brush or being followed around the apiary by a buzzing horde of troublesome robbers. By this method one good hand can remove more honey in less than a half day than can be emptied by a good two-frame extractor in 10 hours, and this, too, in the heat of the day at a time when honey is not being gathered, and where by the old method a man could not work without a bee tent.

The honey house should be provided with screen doors and windows and should be bee tight.

Wire netting should be nailed on the outside casing of windows and extend above the opening several inches, leaving a space between the casing at the top and the wire so as to form an escape for any stray bees that might find their way into the room.

We now need a table, on which we will turn a case bottom up, loosen the set screw, and a slight jar or push will usually loosen all the combs, and the case can be lifted off, leaving the frames of honey in a pile on the table. Shallow pans a little larger than the cases should set on the floor, and as fast as the combs are emptied they should be re-

"Yes, yes," interrupted Mr. Gray, "but you will find Laura in the drawing-room. Explain it to her while dinner is being served."

He pushed the unrepentant fellow into the drawing-room, and himself remaining outside, closed the door behind him.

As Leverton entered, a lady rose from the fauteuil upon which she had been seated. It was Laura.

Somehow at sight of her standing there, looking so fair and so sweet in her evening costume, Leopold forgot all about the lady of the legacy, and a sudden feeling of shame stole into his heart and caused the warm blood to rush up into his cheeks.

There was a moment's awkward pause, and then he said, bravely:

"Laura, I have been a fool. Can you forgive me?"

"It was I who was to blame," she murmured, brokenly.

So he dined off that erring turkey after all, and that is how it came about that when George and Dollie were married in the ensuing Summer there was also a wedding from 71.—Boston Globe.

THE APIARY.

EXTRACTED HONEY.

A Writer Who Claims That It Can be Profitably Produced.

II.

EDITOR AMERICAN FARMER: At the close of the honey harvest, set at convenient places in the apiary, or better still in the honey house, near an open window some bottom boards. Set them level and solid, as they will have to sustain a heavy weight. If these boards are placed in the honey house they must stand in a bright light, else there may be a failure.

Get the hive cart and smoker and whatever tool you use to open your hives. Remove the cover from a hive and give the bees a smoking, sending the smoke at intervals down between the ranges of combs when the bees are mostly down. Remove the top case and set it on the cart. If robbers trouble place a cover or throw a cloth over the case. Repeat this operation with all the cases in rotation, then place the cover on the hive and repeat this operation with other hives until you have all the cases tied up on your cart, so that you can readily wheel. Move them to one of your prepared stands and pile them up as high as is convenient. Place a board (a hive cover is used in our apiaries), with a hole cut through the center four or five inches in diameter, and over this is placed a wire cloth cone large enough at the base to cover or surround the opening in the board and terminating in a small hole at the top just large enough to admit the passage of a single bee. Of course, this cone must be fastened securely to the cover, and there must be no place in the pile of cases that will admit the passage of a bee except the hole in the apex of the wire cloth cone. This calls for clear, dry lumber, a perfect mechanical job of work; and above all else, all the cases should be well painted and stored in the dry and out of the reach of mice when not in use, and every year or two treated to a light coat of good lead and oil paint.

These cases properly made and cared for will last a lifetime, but if they are "thrown together" or made of poor, knotty or green lumber or left year in and year out unpainted, they will be a source of "trouble and vexation of spirit," and the same applies to other supplies. But let us return to our pile of cases which we left partly filled with the bees of different colonies.

The light only entering at one point, and that point at the top, the bees seek it and through the large opening in the cover pass into the wire cloth cone and thence into the open air, and if the opening in the cone is the right size there will be no returning to the cases. They will quietly disperse and return to their respective hives. Of course, for each pile of cases we need one of these cones, and it is the only kind we think we would care to use, and were we taking section honey we would not fuss with a board for each hive and a 20 or 25 cent bee escape fitted to each one. The writer used this method over 20 years ago when bee escapes were unknown, and managed an apiary of 400 colonies with no help whatever except the assistance of a little boy in the honey room when extracting the honey. Long before the last case is removed from the hive, if the apiary is large, the first pile of supers are cleared of bees and ready to be extracted, and they can then be wheeled into the honey house (if they were piled outside).

The reader will notice that we have removed the honey from our bees without moving a frame from its place or using a bee brush or being followed around the apiary by a buzzing horde of troublesome robbers. By this method one good hand can remove more honey in less than a half day than can be emptied by a good two-frame extractor in 10 hours, and this, too, in the heat of the day at a time when honey is not being gathered, and where by the old method a man could not work without a bee tent.

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We now need a table, on which we will turn a case bottom up, loosen the set screw, and a slight jar or push will usually loosen all the combs, and the case can be lifted off, leaving the frames of honey in a pile on the table. Shallow pans a little larger than the cases should set on the floor, and as fast as the combs are emptied they should be re-

placed in the cases and tiered up in the pans, thus taking up the drip that would otherwise go on the floor. As the combs are extracted and replaced they should be securely fastened by the screws, and at about sunset replaced on the hives for the bees to clean up. They are then ready for the Fall crop and protected from the ravages of the bee moth until cold weather, when they can be removed.

Near the comb table should stand the uncapping can. This is about the size of a large extractor can, with a frame-work across the top for the comb frame to rest on, and a screen or sieve a few inches from the top to catch the cappings and drain them into the can below. A honey gate at the bottom draws off the honey when you are through working.

This is the Dandant uncapping can, and is the most complete article of the kind we know of. There are other and cheaper devices that will answer the purpose equally well. One man uses a large butter bowl with a hole in the bottom. A tin pipe fastened in the hole and the lower end of same inserted in a hole in the head of a small barrel, the top of the bowl covered with screen wire to catch the cappings, while the bowl revolving freely on the barrel makes the comb handy to get at.

The extractor should set high enough from the floor so that the honey can run into the bung-hole of a barrel or into some large receptacle. If the apiary be a large one, it will pay to have one part of the floor higher than the other, and then the extractor will not have to be raised so high from the floor in order to let the honey into the barrel or tank.

A tin can holding 250 or 300 pounds, or a wood tank lined with tin and holding a much larger amount, is very convenient, but any receptacle should have a honey gate at the bottom to draw off the honey.

There should be a cheese-cloth bag for the honey to run through as it passes from the extractor to catch the cappings. We will here remark that the shallow frames should be of a size that two of them will go into the extractor where one of the large ones are placed.

RIPENING THE HONEY.

Object is made to extracted honey because it is inferior to comb honey, and we regret to say that oftentimes there is too much truth in the assertion. Honey is thrown from the combs before the water has evaporated and the honey becomes thick to save time(?) and save the bees the expense of sealing over the combs. The result is, as in the case of friend B, "it don't have the flavor of the comb honey." Now, we will make the assertion that honey well ripened on the hive in well-sealed combs, extracted and subjected to a ripening process after being removed from the comb, is not inferior in flavor to any honey gathered from the same kind of flowers and stored in the snowiest of combs and the cleanest of sections. There are a number of people engaged in the bee business who claim to produce a strictly first-class article of extracted honey by ripening the same after removing from the comb the unripe or unsealed honey entirely independent of the aid of the bees. They may be able to do it, but the writer very freely admits that he cannot. I have extracted the unsealed honey and set it in stone jars in a warm room with a cheese-cloth cover over each jar; have set it in deep cans in the sunlight and other ways by the dozen and the water did evaporate and the honey became thick, and at the approach of cold weather often granulated and tasted good; but when you dipped a spoon into the jars of honey from the sealed comb ripened on the hive, the difference was so marked that the merest tyro could notice it.

But to return to our subject: Extracted honey is apt to granulate at the approach of cold weather, and before that time should be placed in whatever package it is intended to sell in. We wish to say, however, that all pure honey does not granulate when in the liquid form, as many people imagine. If our honey has been kept in a warm room through the Summer (a very excellent plan is to set it where the bright sunlight from large windows will strike it, and if the honey house is painted a dark color on the outside it will absorb more solar heat than if it be white), by early Autumn it is ready for the market.

PREPARING THE CROP FOR MARKET.

In preparing extracted honey for market there are many things to be taken into consideration. One is the quality of the honey. If the honey is clover or basswood, and as good as such honey ought to be (and is, if it has been handled as outlined in this article), we have found no better way of placing the same on the retail market than to use the Mason one quart self-sealing fruit jar. This will hold about three pounds of honey, and is of use in every family after the honey has been consumed, which cannot be said of many other receptacles.

FILLING THE JARS.

In filling these jars, or any other small receptacle, it would be well to heat the honey. As it is now very thick you can make it quite warm very easily. The jars stand in shallow pans of water. If we run our jar over it does not spill on the floor and get a daub mess on our hands, like friend B had when he emptied painful after painful into the barrel instead of running directly into the barrel in the first place from the extractor.

As the jars are filled seal them up, and this honey will be found to be so thick that it will hardly run from the jar without heating, and will not granulate in cold weather. For a delicious article of food it is unexcelled by any honey in the comb or maple or other surs.

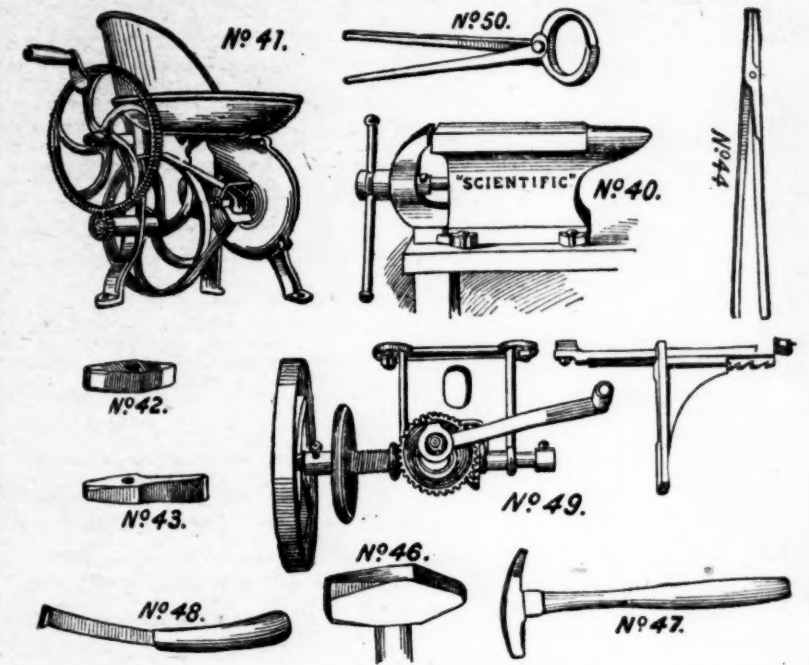
We can buy these jars by the gross and add the retail price of the jar to the price of the honey, thus making the

OUR CHAMPION KIT OF TOOLS

For Farmers, Stockmen, Planters, and Machinists.

BEST ON EARTH. PRICE, COMPLETE, \$20.00.

Furnished Singly at Prices Given Under Each Piece.



No. 40. Combination Anvil and Vise; hardened face; finely polished; weight, 50 lbs. Price \$4.
No. 41. Farmer's Forge, Style 5 B. Will heat 14 inch iron. Price \$5.
No. 42. Blacksmith's Cold Chisel; 14 lbs.; solid cast steel. Price \$5.
No. 43. Blacksmith's Hot Chisel; 14 lbs.; solid cast steel. Price \$5.
No. 44. Blacksmith's Tongs; wrought iron; 18 inches. Price \$5.
No. 45. Screw Plate; 3 taps; 3 set dies, cut 4, 4, and 4 inch. Price \$4.
No. 46. Blacksmith's Hammer and Handle; weight, 2 lbs. Price \$4.
No. 47. Adze; Eye Shaping Hammer and Handle; weight, 9 ozs. Price \$5.
No. 48. Blacksmith's Knife; Westernholm. Price \$5.
No. 49. Blacksmith's Drill Press; hand feed; weight, 50 lbs. Price \$5.
No. 50. Farmer's Pinners; cast steel; 12 inch. Price \$5.
Our vise is solid and strong; face, 4 x 9 inches; jaws, 3 inches wide, and open 4 inches. Our drill is not a cheap bench drill, but a genuine blacksmith's post drill, with adjustable table. Drills 1/2 inch hole to the center of a 17 inch circle. Compare it with other drills offered with kits of tools. Our force is built especially for our kit; 15 inches high to top of jaw; bowl, 14 inches in diameter; fan, 8 inches in diameter; weight, 45 pounds. We guarantee it the lightest running, strongest blast, and the best force made for the purpose. Every tool on the list the best the market affords, and so guaranteed.
Shipping weight complete, 150 pounds.
We warrant every tool the best made, and the kit complete the best and cheapest on the market. Satisfaction guaranteed. Please notice that hammers and chisels are solid steel (not steel faced). Pinners have solid steel jaws. Tongs are hand-made wrought iron. Our drill is a splendid blacksmith's drill, solid and substantial, and equal to any test. Anvil and vise carefully made and superior to any of same size. Farmer's knife best Westernholm blade. Absolutely the best kit ever gotten together. Freight rate is very low on the above.
The above outfit, complete, boxed, ready for shipment, only \$20.00.
Or with the AMERICAN FARMER one year and the outfit complete \$20.25.
Purchaser to pay freight.

same profit that the retail dealer in glassware does, and at the same time sell our honey in a most attractive form.

Many people prefer honey in granulated form—the small lard pail with sloping sides of various sizes, or the small covered pails from two quarts up. These are excellent to retail honey to a class of customers. In this case, when filling, the honey should not be subjected to heat, and it will become very solid. It can, however, be melted by setting in a can of hot water.

A most excellent shipping package is the wooden box holding two cans of 58 pounds each net. These are sold here in the West at 75 to 80 cents per box of two cans, or 65 cents by the 100 boxes. For a few cents extra we can get a honey gate fitting the screw cap on each can, when the package can be turned down on its side on a counter and the contents removed without drip or the admission of flies or other insects. Many wholesale men still prefer the honey keg or barrel for honey. Some of the reasons for this preference are: If a barrel springs a leak (and they often do), it is easy for anyone to tighten up the hoops. They are also cheap, easily handled, and hold a large amount to the package. In the case of oak or other hard wood, it is best to wax the barrel; but with the barrel mostly used here for that purpose, the basswood molasses barrel or keg, holding from 10 to 50 gallons, all that is required is to scald them with boiling water just before filling. The above makes an excellent package for dark buckwheat or Fall honey. We would, however, for first-class white honey, prefer glass or tin all the time, and charge enough for the honey to cover the extra cost of the package.

THE PRICE OF THE PRODUCT.

The price of extracted honey, like every thing else, is principally governed by supply and demand; but honey gathered from white clover or basswood and well ripened as directed in this article, is cheaper at 15 cents per pound than much of the extracted honey on the market at five cents. Anyone engaging in this business must create a demand for a superior article, and every time he gets a customer keep him. Always give him 16 ounces for a pound, and never sell him an ounce of poor honey at any price, and this man will be a walking, talking advertisement of what you have to sell, and he will induce his friends to purchase of you. Place a label on every package of honey you sell with your name and address printed in plain letters and telling your customers the kind of flowers this honey was gathered from; that pure honey very often granulates in cold weather and how to make a liquid of it, and it is an excellent idea to say also that honey of any kind should be kept in a dry, warm place. And whatever kind of package we use, let us always keep everything very clean and in as attractive shape as possible.

A small volume could be written on the above subject, but as this article is already long, we will bring it to a close. —J. A. NASH, Monroe, Iowa.

VERMONT APICULTURE.

Success of the State Beekeepers at the State Experimental Station.

EDITOR AMERICAN FARMER: The result of active, energetic, organized effort in working for some desired end is again well shown in the triumph secured by the Vermont Beekeepers' Association in securing recognition by the State authorities. For several years the association has labored for an experimental apiary on the State farm, or one to be

run in connection with it. At the last annual meeting a special committee was elected to secure the result, if possible.

This committee entered on the work with a zest and purpose to succeed, if success were possible. Personal interviews with members of the Board of Control, individually, were followed by the appearance of the committee before the board at its regular meeting in April. The case presented was a strong one, and the board quite readily acknowledged the justice of the request. They treated the committee courteously, and on the same day voted to add beekeeping as a branch for experimental work and study; and also voted an appropriation to erect a building on the farm suitable for a bee house, honey room, and general utility room. The building is erected, and is a fine one, well made, and convenient for the purposes for which it is designed. The south side will accommodate 24 colonies of bees on two shelves. This feature was added to test the relative advantages of a house apiary and bees outdoors. The location is exposed to winds, and so it is planned to have the yard on the southeast side of the house, and protected by a tight board fence, until a pine hedge can be grown about it.

There are five colonies of bees now in the house, and it is expected that some more will be placed there this Fall by members of the Vermont Beekeepers' Association, and by next Spring the apiary will be equipped sufficiently to do good work. Now that we have the apiary, the next thing needed is an apirist to take charge of the work. It will need a man who thoroughly understands the art in all its different phases; one who will hold himself open to conviction, should experiments not work as he expected or desired; and one who will keep an exact record of each colony and of every thing done; and lastly, but not least, one capable of writing out what is done and doing, both for publication in the bee journals and for the annual report of his work to the director of the station. Fortunately, Vermont numbers among its beekeepers more than one such person, and the only question is, Who will accept the position? The appropriation will not be large at first, and there may be some difficulty in getting one to take the position, but Vermonters are not likely to shirk a plain duty, and I fully believe that they will not be found wanting in this case.

I desire that all beekeepers shall take an active interest in the work done at the station, visit it every time that you are in Burlington, propose experiments to be tried, and, in short, assist in every possible way. The beginning is made, and with your active co-operation and interest the Board of Control will never have occasion to regret the allowance which they have made to an industry that represents so much to the State of Vermont. Not alone would I urge beekeepers to visit the station, but all those interested in agriculture will find there much to interest and instruct along the line of progressive and scientific farming, which these experimental stations are doing so much to teach and spread the truth, that "If you would succeed in the present age you must be both progressive and scientifically progressive."

Vermont is the second New England State to make beekeeping a branch at its experimental station, and one of the few in the country. Burlington is not merely a local railroad center, but a large one, and is of easy access from points in New York both by rail and water, also points in New Hampshire; and thus beekeepers can easily communicate with and cheaply visit the station.—H. M. SCOTT, Barre, Vt.

Established . . . 1819.

74TH YEAR.

THE AMERICAN FARMER.

"O fortunatum nimium sua et bona norunt agricolas."—Vergil.

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have an opportunity

to see it and examine it,

with a view to subscribing.

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with those of other papers, and see if you

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ought to have it; that you cannot afford

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attention to the paper.

THE AMERICAN FARMER is the only

representative and champion the farmers

of the country have in Washington. It

is here to fight for their interests, and for

those only. It is strictly non-partisan,

and has no friends or enemies, except the

friends and enemies of the farmers.

It has no partisan axes to grind, and

cares for no public man except in his

relation to farmers' interests. It will

praise every true friend of the farmers,

and denounce all their enemies, without

regard to whether they are Republicans,

Democrats, Populists, or whatever their

condition of political servitude may be.

Not a man connected with THE AMERICAN

FARMER ever held a political office, desires

one, or would accept one. They are

foot-loose, and fancy free as regards

political entanglements, and their only

ambition is to make the best farming

paper in the country, and render signal

service in advancing agricultural prosperity

to the highest pitch.

In 1891 88 per cent. of the cotton

spindles in the country were in the North,

leaving but 12 per cent. in the South.

Since that time the whole number has

increased from 14,781,000 to 15,041,023,

and the proportion in the South has in-

creased to 14 per cent., leaving 86 per

cent. in the North.

THE AMERICAN FARMER is in Wash-

ington to fight for the farmers "against

all their enemies and opposers whatso-

ever." If you want to help in the fight,

subscribe for the paper, and get your

neighbors to do the same.

Why, after all the palaver about

"robber tariff barons," "greedy, mercile-

less trusts," and "crushing combines,"

are the wool growers of the country

selected for the first and severest

attack?

Ask all your neighbors to subscribe

for THE AMERICAN FARMER.

THE AMERICAN FARMER intends to

do all possible to promote the emigration

of Northern farmers to the South.

We believe that good land can be got

there cheaper than anywhere else in the

country, and that the conditions of suc-

cess are better there.

HAVE the farmers who owned a few

sheep been the sinners above all others

under the protection system? If not,

why are they selected for the first and

FARMING MUST BE MADE TO PAY.

We are unalterably of the belief that

the one supreme issue before the Ameri-

can people is that of making farming

profitable.

This far surpasses all other issues in

vital importance. Unless the farm can

be made to yield a profit to the man

who tills it there can be no prosperity in

the country, and the discussion of other

questions is merely a waste of time. It

is like the people of Constantinople dis-

puting over theological points while the

Turks are battering in their gates.

It seems trite and commonplace to say

that unless the farmer makes money

nobody else in the country can continue

to do so; but trite and commonplace as

this is, it is still the sternest of truths,

and the one which, alas, our people are

most likely to ignore or forget.

Amid all the talk and the wilderness

of theories which deluge the land in

regard to the causes of the present strin-

gency, one stubborn, unquestionable

fact stands out clear and unmistakable.

That fact is that if in the past 10 years

each farmer had been able to get even a

few dollars more than he did for each

acre that he cultivated, there would

have been no runs on the banks, there

would have been no stoppage of factories,

and over 1,000,000 men would not now

be vainly seeking employment.

One-half of our whole population is

engaged in cultivating the soil, and the

other half is making its living in some

way or another out of those cultivators.

Refine and complicate the question as

you will, that is it in a nutshell. An

exceptional country like England may

be in a measure independent of its farm-

ers. Whether the English farmers are

prosperous or not, a large proportion of

the people of England can still make

money by selling goods, lending money,

sailing ships, and performing other ser-

vices for the people of the world outside

of England.

But in the United States the factories

can only make what our farmers want to

buy; the merchants can only do business

in buying from and selling to the farm-

ers, and the railroads can only make

money carrying what the farmers have

to sell and what they buy in return.

Everything finally pivots on the

farmer, and there is no man in the coun-

try, no matter what his wealth or his

occupation, that is not directly affected

by the farmer's financial position.

Take, for example, the wealthiest

family in New York, the Astors. Their

wealth is mainly in New York real

estate, and would seem to be utterly in-

dependent of any connection with the

farmer's interests. But any serious

diminution of the gains of the farmers

of the country, would at once make

itself felt in the diminution of the rents

of the Astors.

We are therefore justified in demand-

ing that the farmers' interests shall be

made as paramount in legislation and

in the administration of the Govern-

ment as they are in economic reality.

While we believe that the farmer should

help himself, and neglect nothing in in-

dustry, scientific knowledge, and pro-

gressive methods to make the most out

of his farm, yet we are equally strenuous

in the belief that the Government should

give him every assistance in its power.

It should, whenever possible, protect

him by tariff legislation against injuri-

ous competition from outside the country.

If it is ever a question between the

farmer and the manufacturer as to which

should be protected, the farmer should

have the first consideration.

We do not believe that a single agri-

cultural product which can be raised on

our own soil should be allowed to enter

this country duty free.

We are to-day paying nearly \$200-

THE HAY TARIFF.

It is better late than never, and the

farmers of Michigan and New York are

at last waking up to the benefits of the

duty on hay, and taking some action to

have it retained.

The duty on hay is \$4 a ton, and New

York dealers find that it is a profitable

thing to take Canadian hay which has

been shipped to them in bond for ex-

portation to Europe out of the bonded

warehouses and sell it in New York.

Canadian hay delivered in New York

averages \$12.50 a ton; adding \$4 duty,

makes the price \$16.50, which is so far

below the ruling price in the city as to

pay the dealers a fair profit.

Canada has, it is estimated, 300,000

tons of surplus hay to dispose of some-

where, and if it were not for the tariff

she would find a market for it in the

Eastern States, to the destruction of the

markets which have been built up there

for the products of the Michigan, New

York, Pennsylvania, and Ohio meadows.

Previous to the imposition of the duty

on hay no hay was sent from the inter-

ior of the country to the eastern sea-

board, as all that was needed was sup-

plied from Canada. The tariff opened

this market to American farmers, and

has given them a very fine revenue.

Though the money market is much

easier and daily becoming better, it is

still tight enough to enable it to be

easily manipulated by the money lords,

and this accounts for the weak and uncer-

tain produce markets for the past month.

There should be a stiff advance in the

prices of all manner of produce in the

face of the universal shortage in this

country and Europe, but this cannot

take place in so long as the financial

situation remains so precarious. But in

spite of all efforts to the contrary the

situation keeps on steadily improving.

The banks are slowly losing their fears

of runs, and are gradually losing the

tight grip they have kept on their cur-

rency. It is very costly to have their

money lying idle. It means a disagree-

able diminution of their dividends at the

close of the year. Another month, we

are positive, will see a general unlocking

of hoards and great activity in all

branches of business.

The bad effects of the wild gambling

last Spring in Chicago in wheat still con-

tinue to manifest themselves. Part of

the decline in wheat in Chicago last week

was attributable to the crowding on to

the market of heavy stocks by the

Northwestern concerns which were crip-

pled in the Cudahy corner. Nothing

could show more conclusively the vicious-

ness of such operations and the neces-

sity of the Anti-Option Law. By no

possibility could a single farmer have

made any money by the success of that

corner, and yet every farmer in the

country lost money by it, and still con-

tinues to do so.

THE TARIFF REVISION.

The Ways and Means Committee of

the House of Representatives closed its

hearings of those interested in tariff re-

vision Sept. 20. Appearances favor the

belief that the hearings might as well

have never begun, for all the effect they

will have upon the tariff reducers. The

whole matter had a perfunctory, *pro*

forma shape, that made the outlook hope-

less for any change in the preconceived

opinions of the majority of the commit-

tee.

One of the amazing things done by

the Chairman of the committee was to

refuse a hearing to Hon. Wm. Lawrence,

the President of the American Wool-

Growers' Association. It is inexplicable

that a man who represents over 1,000,000

farmers, should have been denied a hear-

ing to protest against the destruction of

more than \$100,000,000 worth of their

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tee.

One of the amazing things done by

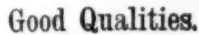
the Chairman of the committee was to

refuse a hearing to Hon. Wm. Lawrence,

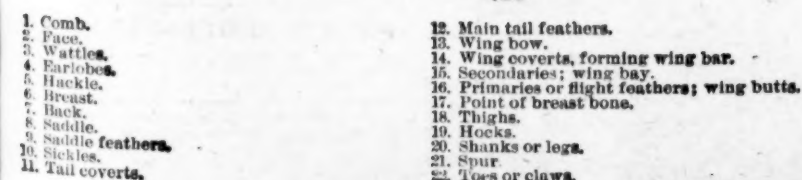
the President of the American Wool-

Growers' Association. It is inexplicable


that a man who represents over 1,000,000



The following chart shows the sectional parts of a fowl:



al parts of a fowl:



22

23

12. Main tail feathers.
13. Wing bow.
14. Wing coverts, forming wing bar.
15. Secondaries; wing bay.
16. Primaries or flight feathers; wing butts.
17. Point of breast bone.
18. Thighs.
19. Hocks.
20. Shanks or legs.
21. Spur.
22. Toes or claws.

strips of slitted woollen cloth are tacked to reach within an inch of the floor. The floor is held in place by cleats at each end, which

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ciding whether horses should be fed before or after watering. As an animal is nourished not by what it merely eats

Heaven furnished horseshoes to Frann Morris' horse at Worthington, W. Va. Some years ago an greilite fell near there which contained iron, which was melted out and made into horseshoes.

Carpet Wools—Aleppo, 13a14; Angora 1
Assyrian, 12a13; Cordova, 15a16; Valp
nominal, 16; Donskoi Autumns, 19a20; c
ings, 24a26; cardings, nominal, 20a22; g

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44144;	double-head barrel.....	\$2 50
araiso	Apples, King, hand picked, per	
comb-	barrel.....	2 50
greasy	Apples, Holland, pippin, per large	

Onions, Connecticut, white, per barrel.....	1 65
Onions, Connecticut, red, per barrel.....	2 75
Onions, Connecticut, yellow, per barrel.....	1 75
Onions, New Jersey, yellow, per barrel.....	1 75
Onions, Long Island, yellow, per barrel.....	1 75
Ex-Eggplant, New Jersey, per barrel.....	1 00
Cauliflower, per barrel.....	1 00
celery, State of New York, per dozen.....	1 00

\$3.00 tions are sent with each razor that anyone can
 \$3.00 shave himself easily, even if he has never used
 any kind of a razor before.
 We will send this razor, postpaid, on receipt

save time and labor in calling when meals are ready. They are useful in case of fire or accident to call assistance. They are a protection to helpless ones left alone in case of unwelcome visitors.

No.	Style.	Diameter.	Complete.	Bronzed.
507.....	1.	15 inch.....	40 lbs.....	\$1.40
508.....	2.	" " " " " " " "	50 " " " "	1.75
509.....	3.	" " " " " " " "	75 " " " "	2.00
510.....	4.	" " " " " " " "	100 " " " "	2.60

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